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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/922,783	08/07/2001	Young Ho Park	HI-0037	8871

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EXAMINER

ELAHEE, MD S

ART UNIT	PAPER NUMBER
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2645

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DATE MAILED: 05/27/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/922,783

Applicant(s)

PARK, YOUNG HO

Examiner

Md S Elahee

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 03 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: ____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-5, 8-10, 12 and 15-20 are rejected under 35 U.S.C. 102(e) as being anticipated by Holshouser et al. (U.S. Patent No. 6,151,486).

Regarding claim 1, Holshouser teaches a telephone body provided with a keypad (fig. 1A, 1B, element 16; col.4, lines 17-23).

Holshouser further teaches a hinge (i.e., hinge shaft) provided at an end of the telephone body (fig. 1A, 1B, 3A, 3B; col.4, lines 17-27, 40, 46, 47, col.5, lines 8-14).

Holshouser further teaches a spring disposed within the telephone body and configured to elastically support the hinge (fig. 3A, 3B; col.5, lines 14-23).

Holshouser further teaches a flip cover hingedly connected to the telephone body through a plurality of hinge caps inserted onto the hinge shaft, wherein the flip cover is configured to pivot on the hinge shaft, thereby exposing the keypad (fig. 1A, 1B, 3A, 3B; col.5, lines 8-27). (Note: hinge assemblies incorporate springs which inherently connect a flip cover to the telephone body through a plurality of hinge caps inserted onto the hinge shaft)

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Holshouser further teaches at least one magnetic object 92 (i.e., electromagnet) provided at one side of the telephone body and configured to apply an electromagnetic force toward the flip cover (fig.3A, 9; col.8, lines 43-67). (Note: magnetic object of bottom housing is being encircled by conductive coil which produces a magnetic field when electric current flows through it, therefore, the magnetic object 92 is working as electromagnet)

Holshouser further teaches at least one permanent magnet provided at one side of the flip cover and proximate to the electromagnet when the flip cover is in the closed position (fig.3A, 9; col.8, lines 60-67).

Regarding claim 2, Holshouser teaches that the electromagnet and the permanent magnet are configured to oppose (i.e., repel) one another when the electromagnet is energized (fig.3A, 9; col.8, lines 43-67).

Regarding claim 3, Holshouser teaches a switch configured to momentarily energize the electromagnet when the mobile telephone is activated (fig.8; col.8, lines 8-18).

Regarding claims 4 and 10, Holshouser teaches a plurality of electromagnets disposed on the telephone body, and a corresponding plurality of permanent magnets disposed on the flip cover, wherein each permanent magnet is located on the flip cover adjacent to a respective electromagnet when the flip cover is in a closed position (fig.7, 9; col.7, lines 14-21, col.8, lines 43-67).

Regarding claims 5, 12 and 17, Holshouser teaches a switch configured to momentarily energize the plurality of electromagnets when the mobile telephone is activated (fig.7-9; col.7, lines 14-21, col.8, lines 43-67).

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Regarding claim 8 is rejected for the same reasons as discussed above with respect to claims 1-3. Furthermore, Holshouser teaches a spring (i.e., elastic) member configured to bear on the hinge shaft, wherein the spring member urges the flip cover to an open position when the hinge shaft is rotated past a certain angle (fig. 3A, 3B; col.5, lines 14-23).

Regarding claim 9, Holshouser teaches that the electromagnet and the permanent magnet cooperate to push the flip cover past the certain angle when the electromagnet is energized (fig.3A, 9; col.8, lines 43-67).

Regarding claim 15, Holshouser teaches rotatably attaching a flip cover to a telephone body with a hinge (fig.1A, 1B; col.4, lines 17-22).

Holshouser further teaches holding the flip cover in a closed position with a spring (i.e., elastic) member bearing on the hinge (fig. 3A, 3B; col.5, lines 15-23).

Holshouser further teaches urging the flip cover into an open position when the flip cover is rotated past a certain angle (fig. 3A, 3B; col.5, lines 15-23).

Holshouser further teaches rotating the flip cover from the closed position past the certain angle by energizing an electromagnet (fig.3A, 9; col.8, lines 43-67).

Regarding claim 16, Holshouser teaches that the urging the flip cover into an open position comprises applying a force on the flip cover with the elastic member (fig.3A, 6B, 9; col.5, lines 15-23, col.6, lines 38-45, col.8, lines 43-67).

Regarding claim 18, Holshouser teaches energizing an electromagnet comprises simultaneously activating a mobile telephone (fig.8, 9; col.8, lines 8-18, 43-67).

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Regarding claim 19, Holshouser teaches rotating the flip cover from the closed position comprises applying a magnetic force upon a permanent magnet disposed upon the flip cover (fig.6C; col.6, lines 46-53).

Regarding claim 20 is rejected for the same reasons as discussed above with respect to claims 1-3 and 15.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 6 and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Holshouser et al. (U.S. Patent No. 6,151,486) and in view of Horne (U.S. Patent No. 5,983,083).

Regarding claims 6 and 13, Holshouser fails to teach "said spring is a leaf spring". Horne teaches that the spring is a leaf spring (col.3, lines 21-27). Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Holshouser to incorporate the spring being a leaf spring as taught by Horne. The motivation for the modification is to have doing so in order to interact with the cam section of the shaft as the cover is folded from its open position to the closed position.

5. Claims 7 and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Holshouser et al. (U.S. Patent No. 6,151,486) and in view of Go (U.S. Patent No. 6,091,938).

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Regarding claims 7 and 14, Holshouser fails to teach "said spring is a coil spring". Go teaches that the spring is a coil spring (col.3, lines 3-9). Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Holshouser to incorporate the spring being a coil spring as taught by Go. The motivation for the modification is to have doing so in order to engage the projection with the depressed part of the cam hinge.

6. Claim 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over Holshouser et al. (U.S. Patent No. 6,151,486) and in view of Metroka et al. (U.S. Patent No. 6,091,938).

Regarding claim 11, Holshouser fails to teach "a momentary switch". Metroka teaches a momentary switch (col.3, lines 55-57). Thus, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Holshouser to incorporate a momentary switch as taught by Metroka. The motivation for the modification is to have doing so in order to accomplish the on/off power.

Conclusion

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Nagai (U.S. Patent No. 5,668,867) teach Foldable portable telephone with improved antenna gain, Tomimori (U.S. Patent No. 6,456,841) teach Mobile communication apparatus notifying user of reproduction waiting information effectively and Harms (U.S. Patent No. 5,732,331) teach Portable radio having a detachable flip portion.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alam Elahee whose telephone number is (703) 305-4822. The examiner can normally be reached on Mon to Fri from 9:00am to 5:30pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jeffrey Hofsass can be reached on (703)305-4717. The fax phone numbers for the organization where this application or proceeding is assigned are (703) 872-9314 for regular communications and (703) 872-9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-4750.

M.E.

MD SHAFIUL ALAM ELAHEE

May 15, 2004

FAN TSANG
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600

A handwritten signature in black ink, appearing to read 'Fan Tsang', is written over the printed name and title.